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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/632,043	07/31/2003	Michael G. Pope	13539US03	9645
23446	7590	08/18/2004	EXAMINER	
MCANDREWS HELD & MALLOY, LTD 500 WEST MADISON STREET SUITE 3400 CHICAGO, IL 60661			RINEHART, KENNETH	
			ART UNIT	PAPER NUMBER
			3749	

DATE MAILED: 08/18/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/632,043

Applicant(s)

POPE, MICHAEL G.

Examiner

Kenneth B Rinehart

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 14 July 2003.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-72 is/are pending in the application.
- 4a) Of the above claim(s) 1-6, 13-17 and 24-59 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 7-12, 18-23 and 60-72 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 31 July 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 11/20/03.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Election/Restrictions***

Applicant's election with traverse of Group II in the reply filed on 7/14/2004 is acknowledged. The applicant request that the other claims be withdrawn from consideration without prejudice to applicant's right to file divisional applications. The requirement is still deemed proper and is therefore made FINAL.

This application contains claims 1-6, 13-17, and 24-59 drawn to an invention nonelected with traverse in 3/29/04. A complete reply to the final rejection must include cancellation of nonelected claims or other appropriate action (37 CFR 1.144) See MPEP § 821.01.

### ***Drawings***

The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the a plurality of process gas inlets operably connected to the reactor chamber, the plurality of process gas inlets configured to allow the flow of a process gas into the reactor chamber, at least a portion the perforated liner is configured to restrain at least a portion of the plurality of feedstock material adjacent to the perforated liner must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure

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is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency.

Additional replacement sheets may be necessary to show the renumbering of the remaining figures. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

***Claim Rejections - 35 USC § 112***

The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 10, 60- 69, and 71 rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. Claims 10, 60, 69, 71 refer to at least a portion the perforated liner is configured to restrain at least a portion of the plurality of feedstock material adjacent to the perforated liner which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

*Claim Rejections - 35 USC § 103*

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 7-9, 11-12, 18-23, 70, 72 are rejected under 35 U.S.C. 103(a) as being unpatentable over Barnes in view of Rotter. Barnes discloses a top (11, fig. 1), a bottom (20, fig. 1), and a plurality of sidewalls (fig. 1, col. 2, lines 72-73), at least a portion of the plurality of sidewalls being operably connected to form a reactor chamber (fig. 1), the reactor chamber configured to receive and gasify a plurality of feed stock material (26, 27, fig. 1); at least one layer of insulative material, the at least one layer of insulative material being operably connected to the reactor chamber or at least a portion of the sidewalls(col. 2, lines 64-70) at least one burner, the at least one burner operably connected to the reactor chamber (30, 31, fig. 1); a perforated liner spaced inwardly from the plurality of sidewalls (24, 25, fig. 1) ... operably connected to the reactor chamber configured to allow the flow of gasification process gas through the space between said inner liner and said plurality of sidewalls, the process gas inlets configured to allow the flow of a gasification process gas into the reactor chamber (14, fig. 2), at least one vent, the at least one vent operably connected to the reactor chamber , the at least one vent configured to allow the flow of process gas out of the reactor chamber (11, fig. 1), the reactor chamber is operably connected to a return air line, the return air line being configured to transport a plurality of recycled process gas (14, fig. 1), a perforated liner operably positioned inside within the reactor chamber, the perforated liner configured to

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expose at least a portion of surface of the plurality of feed stock material adjacent to the perforated liner to at least a portion of the gasification process gas (24, 25, fig. 1), the liner is comprised of at least one perforated column (24, 25, fig. 1), the interior chamber includes a liner, the liner being configured to permit the transport of a gasification process gas to at least a portion of the feed stock material (24, 25, fig. 1), the perforated liner is configured to prevent at least a portion of the plurality of process gas inlets from being occluded by the plurality of feed stock material adjacent to the perforated liner (fig. 1). Barnes discloses applicant's invention substantially as claimed with the exception of at least one access loading door operably connected to the reactor chamber; and at least one disposal opening operably connected to the reactor chamber, the reactor chamber has at least five sidewalls, the plurality of sidewalls form a column, the reactor chamber includes at least one inclined surface, the at least one inclined surface having a first portion and a second portion, the first portion being operably connected to the plurality of sidewalls, the at least one inclined surface having an inward inclination from the first portion toward the second portion, the second portion being operably connected to at least one of the at least one disposal opening, a perforated grate operably positioned inside the reactor chamber, the perforated liner is comprised of wire mesh, the plurality of sidewalls form a column, process gas inlets. Rotter teaches at least one access loading door operably connected to the gasification reactor chamber; and at least one disposal opening operably connected to the gasification reactor chamber (L1, and 12C, fig. 1), the reactor chamber includes at least one inclined surface (22, fig. 1), the at least one inclined surface having a first portion and a second portion (upper portion of 22 and lower portion of 22, fig. 1), the first portion being operably connected to the plurality of sidewalls (fig.

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1), the at least one inclined surface having an inward inclination from the first portion toward the second portion (fig. 1), the second portion being operably connected to at least one of the at least one disposal opening (12c, fig. 1), a perforated grate operably positioned inside the reactor chamber (24, fig. 1) for the purpose of adding fuel and removing processed fuel. It would have been obvious to one of ordinary skill in the art to modify Barnes by including at least one access loading door operably connected to the gasification reactor chamber; and at least one disposal opening operably connected to the gasification reactor chamber, the interior chamber includes at least one inclined surface, the at least one inclined surface having a first portion and a second portion, the first portion being operably connected to the plurality of sidewalls, the at least one inclined surface having an inward inclination from the first portion toward the second portion, the second portion being operably connected to at least one of the at least one disposal opening, a perforated grate operably positioned inside the reactor chamber as taught by Rotter for the purpose of adding fuel and removing processed fuel. Barnes in view of Rotter discloses applicant's invention substantially as claimed with the exception of the reactor chamber has at least five sidewalls, the plurality of sidewalls form a column, the perforated liner is comprised of wire mesh, process gas inlets. At the time the invention was made, it would have been an obvious matter of design choice to a person of ordinary skill in the art to have a cylinder or five sidewalls or wire mesh or plural inlets because Applicant has not disclosed that the number of sidewalls or shape or material or number of inlets provides an advantage, is used for a particular purpose, or solves a stated problem. One of ordinary skill in the art, furthermore, would have expected Applicant's invention to perform equally well with either the number of sidewalls, shape, material

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and inlet of Barnes or the claimed sidewalls, shape, material, and inlets, because both quantities of sidewalls and inlets, shapes, and materials perform the same function of processing material equally well.

### *Conclusion*

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenneth B Rinehart whose telephone number is 703-308-1722. The examiner can normally be reached on 7:30 -4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ira Lazarus can be reached on 703-308-1935. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.



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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

KBR

  
**KENNETH RINEHART**  
**PRIMARY EXAMINER**